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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---------------|----------------------|-------------------------|------------------|
| 10/679,950 | 10/06/2003 | Marcel Hunn | 33635/US | 3584 |
| 759 | 90 08/14/2006 | | EXAMINER | |
| David E. Bruhn Dorsey & Whitney LLP Intellectual Property Department 50 South Sixth Street, Suite 1500 Minneapolis, MN 55402-1498 | | | MACNEILL, ELIZABETH | |
| | | | ART UNIT | PAPER NUMBER |
| | | | | FAFER NOMBER |
| | | | 3767 | |
| | | | DATE MAILED: 08/14/2006 | |

Please find below and/or attached an Office communication concerning this application or proceeding.

| | | Application No. | Applicant(s) | | | |
|--|---|---------------------------------|--------------|--|--|--|
| Office Action Summary | | 10/679,950 | HUNN ET AL. | | | |
| | | Examiner | Art Unit | | | |
| | | Elizabeth R. MacNeill | 3767 | | | |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply | | | | | | |
| A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b). | | | | | | |
| Status | | | | | | |
| 1)[\] | Responsive to communication(s) filed on <u>05/02</u> | 2/2006 | | | | |
| ′= | | action is non-final. | | | | |
| 3) | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is | | | | | |
| ٥/ك | closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. | | | | | |
| Disnositi | ion of Claims | , parto gasjio, 1000 0121 11, 1 | 00 0101 2101 | | | |
| | | !:*: | | | | |
| • | Claim(s) 1-21 and 26-52 is/are pending in the application. | | | | | |
| | 4a) Of the above claim(s) <u>9,12,15,17,18,22-25,28-32,34,36 and 38-52</u> is/are withdrawn from consideration. | | | | | |
| · — | 5) Claim(s) is/are allowed. | | | | | |
| | 6) Claim(s) <u>1-8,10,11,13,14,16,19-21,26,27,33, 35 and 37</u> is/are rejected. | | | | | |
| 7)∐ | Claim(s) is/are objected to. | r aloation requirement | | | | |
| اــا(ه | Claim(s) are subject to restriction and/or | r election requirement. | | | | |
| Applicati | ion Papers | | | | | |
| 9) | The specification is objected to by the Examine | r. | | | | |
| 10)⊠ The drawing(s) filed on <u>06 October 2003</u> is/are: a)⊠ accepted or b)□ objected to by the Examiner. | | | | | | |
| | Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). | | | | | | |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. | | | | | | |
| Priority (| under 35 U.S.C. § 119 | | | | | |
| 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). | | | | | | |
| * See the attached detailed Office action for a list of the certified copies not received. | | | | | | |
| • | % | | | | | |
| Attachmen | t(s) | | | | | |
| 1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413) | | | | | | |
| Notice of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date Notice of Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 01/17/2006. Other: | | | | | | |

DETAILED ACTION

Election/Restrictions

1. Applicant's election with traverse of Species I in the reply filed on 2 May 2006 is acknowledged. The traversal is on the ground(s) that all the claims read on the elected species. This is not found persuasive because in the description of figures 1a and 1b of Species I, it is specified that the outer material of the cannula is dissolved after application and is of a greater hardness than the inner material. Additionally, no reference to a curved or bent cannula is given.

The requirement is still deemed proper and is therefore made FINAL.

Claim Rejections - 35 USC § 112

- 2. The following is a quotation of the second paragraph of 35 U.S.C. 112:
 - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 3. Claim 8 recites the limitation "said polymer" in reference to claim 6. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

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- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 5. Claims 1-7,10,11,13,14,16,19-21,26,27,33, 35 and 37 are rejected under 35 U.S.C. 102(b) as being anticipated by IWATSCHENKO (US #4,306,563).

Regarding claim 1, Iwatschenko teaches "A cannula (2) which increases in pliability during application, wherein, prior to application, said cannula comprises one a material

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of a first variable hardness (8) and a second material having a second hardness (2), of which said material having the greater hardness is at least partially dissolved during use." See Col 3 lines 20-25 and Claim 1.

Regarding claim 2, the hardness of the material of first variable hardness decreases during use, due to dissolving (Col 1 lines 54-62)

Regarding claim 3, the two materials are a composite (Fig 1)

Regarding claim 4, the outer material, which dissolves during use, is the hardest material (Col 3 lines 20-25)

Regarding claim 5, the composite is a solid-state material (plastic, Col 1 line 9) and an organic polymer (PVA, Col 3 line 10)

Regarding claim 6, the dissolving material is water-absorbing (Col 3 line 15)

Regarding claim 7, the water-absorbing material is a polymer (PVA)

Regarding claim 10, the cannula contains a material of lower hardness (2) than the dissolving material (8)

Regarding claim 11, the material of first variable hardness at least partially surrounds the material having a lower initial hardness (Fig 1)

Regarding claim 13, the hardness of the material of lower hardness does not change during use (plastic, Col 1 line 9)

Regarding claim 14, the material of greater hardness surrounds the material of lower hardness (Fig 1)

Regarding claim 16, the material of greater hardness is an absorbable material which dissolves during use (PVA, Col 3 line 10)

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Regarding claim 19, the PVA is readily water soluble, and meets the limitation of the applicants specification regarding the preferred materials as disclosed in the specification.

Regarding claim 20, the material having the greater hardness is removed during use (by dissolution)

Regarding claim 21, are separated by layers (Fig 1)

Regarding claim 26, Iwatschenko teaches "A cannula that increases in pliability during use, wherein prior to use the cannula comprises at least one material of variable hardness (8), said at least one material dissolved during use" (Col 3 line 10)

Regarding claim 27, Iwatschenko teaches "A cannula that increases in pliability during use, wherein prior to use the cannula comprises at least two materials of differing hardness (2 and 8), of the material having the greater hardness is dissolved during use" (Col 3 line 10)

Regarding claim 33, Iwatschenko teaches "A cannula that increases in pliability during use," wherein the cannula comprises a water-absorbing material (PVA, 8) of a first variable hardness that decreases in hardness upon water absorption (Col 3 line 8) and a material having a second hardness (plastic)

Regarding claim 35, the water absorbing material has polar functional groups (acetate Col 3 line 11)

Regarding claim 37, the water-absorbing material is the outer material of the cannula, and the material having the second hardness is the inner material of the cannula.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Elizabeth R. MacNeill whose telephone number is (571)-272-9970. The examiner can normally be reached on 7:00-3:30pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Sirmons can be reached on (571)272-4965. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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KEVIN C. SIRMONS SUPERVISORY PATENT EXAMINER

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